

We claim:

1. A method of applying a coating on a paper substance comprising:
moving a paper over a roller;
5 applying a coating color to the paper with a coating color applicator;
vibrating a blade with an ultrasonic transducer in operative engagement with the blade; and
applying the vibrating blade to the paper to scrape off
10 excessive coating color from the paper.
2. The method according to claim 1 wherein the method further comprises bending the blade with a pressure applicator that bears against the blade while the paper moves passed the
15 blade.
3. The method according to claim 1 wherein the method further comprises providing the coating color applicator with an ultrasonic transducer and subjecting the coating color with an
20 ultrasonic energy from the ultrasonic transducer to lower a the viscosity of the coating color.
4. The method according to claim 1 wherein the method further comprises transferring ultrasonic vibration from the
25 ultrasonic transducer to a blade tip of the blade.
5. The method according to claim 1 wherein the method further

comprises holding the blade with a holder and providing the holder with grooves to prevent transmission of ultrasonic energy along a width of the holder.

5 6. The method according to claim 1 wherein the method further comprises adhering the ultrasonic transducer directly on the blade.

10 7. The method according to claim 5 wherein the method further comprises firmly holding the blade in the holder to prevent loss of ultrasonic energy transferred from the ultrasonic transducer through the holder to the blade and circulating water through pins.

15 8. The method according to claim 1 wherein the method further comprises applying the coating color through an endless wire.

20 9. The method according to claim 8 wherein the method further comprises applying the coating color while subjecting the coating color to ultrasonic energy.

10. The method according to claim 2 wherein the method further comprises providing the pressure applicator with an ultrasonic transducer that vibrates the pressure applicator.